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COPY OF PAPERS
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#4

SEQUENCE LISTING

#4

<110> OncoGen, Inc.
Komoriya, Akira
Packard, Beverly

<120> COMPOSITIONS FOR THE DETECTION OF ENZYME ACTIVITY IN BIOLOGICAL SAMPLES
AND METHODS OF USE THEREOF

<130> 300-903840US

<140> US 09/874,350

<141> 2001-06-04

<150> PCT/US98/00300

<151> 1998-02-20

<150> PCT/US00/24882

<151> 2000-09-11

<150> US 09/394,019

<151> 1999-09-10

<150> US 08/802,981

<151> 1997-02-20

<160> 221

<170> PatentIn version 3.0

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Lys Asp Ala Ile Pro Met Ser Ile Pro Lys Gly Tyr
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Lys Asp Ala Ile Pro Xaa Ser Ile Pro Lys Gly Tyr
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<223> X is Aib or Pro

<400> 14

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-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----

1 5 10 15

Gly Tyr

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Lys Asp Xaa Xaa Gly Asp Glu Val Asp Gly Ile Asp Gly Xaa Pro Lys
1 5 10 15

Gly Tyr

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Lys Asp Pro Xaa Gly Asp Glu Val Asp Gly Ile Asn Gly Xaa Pro Lys
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Gly Tyr

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Lys Gly Tyr

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Lys Asp Pro Xaa Gly Asp Glu Val Asp Gly Ile Asn Gly Pro Lys Gly
1 5 10 15

Tyr

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Tyr

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Lys Asp Pro Xaa Gly Asp Glu Val Asp Gly Ile Asp Gly Xaa Pro Lys
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Lys Asp Pro Xaa Gly Glu Glu Val Glu Gly Ile Asn Gly Xaa Pro Lys
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Gly Tyr

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Lys Asp Pro Xaa Gly Asp Phe Val Asp Gly Ile Asn Gly Xaa Pro Lys
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Gly Tyr

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Gly Tyr

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Gly Tyr

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Gly Tyr

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Lys Asp Xaa Xaa Gly Asp Glu Val Asp Gly Ile Asp Gly Xaa Pro Lys
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Gly Tyr

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Lys Asp Xaa Xaa Gly Asp Glu Val Asp Gly Ile Asn Gly Xaa Pro Lys
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Gly Tyr

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Gly Tyr

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Lys Gly Tyr

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Lys Asp Xaa Xaa Gly Asn Glu Val Asp Gly Ile Asp Gly Xaa Pro Lys
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Gly Tyr

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Gly Tyr

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Gly Tyr

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Gly Tyr

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 Gly Tyr

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Lys Asp Xaa Xaa Gly Xaa Asp Glu Val Asp Gly Ile Asp Gly Xaa Pro
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Lys Gly Lys

<210> 38

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<223> X is Aib

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Lys Gly Tyr

<210> 39

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Lys Asp Xaa Xaa Gly Trp Asp Glu Val Asp Gly Ile Asp Gly Xaa Pro
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Lys Gly Tyr

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Lys Asp Xaa Xaa Gly Trp Asp Glu Val Asp Gly Ile Asp Gly Xaa Pro
1 5 10 15

Lys Gly Tyr

<210> 41

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<223> X is epsilon aminocaproic acid

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Lys Asp Xaa Xaa Gly Xaa Xaa Asp Glu Val Asp Gly Ile Asp Gly Xaa
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Pro Lys Gly Tyr
20

<210> 42

<211> 20

<212> PRT

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Lys Asp Xaa Xaa Gly Trp Trp Asp Glu Val Asp Gly Ile Asp Gly Xaa
1 5 10 15

Pro Lys Gly Tyr
20

<210> 43
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Lys Asp Xaa Tyr Val Ala Asp Gly Ile Asp Pro Lys Gly Tyr
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Lys Asp Xaa Tyr Val Ala Asp Gly Ile Asn Pro Lys Gly Tyr
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<400> 45

Lys Asp Xaa Tyr Val Ala Asn Gly Ile Asn Pro Lys Gly Tyr
1 5 10

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<400> 46

Lys Asp Xaa Gly Tyr Val Ala Asp Gly Ile Asp Gly Pro Lys Gly Tyr
1 5 10 15

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<400> 47

Lys	Asp	Xaa	Gly	Tyr	Val	Ala	Asp	Gly	Ile	Asn	Gly	Pro	Lys	Gly	Tyr
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Lys	Asp	Xaa	Gly	Tyr	Val	Ala	Asn	Gly	Ile	Asn	Gly	Pro	Lys	Gly	Tyr
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Lys Asp Xaa Xaa Gly Tyr Val Ala Asp Gly Ile Asp Gly Xaa Pro Lys
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Gly Tyr

<210> 50

<211> 18

<212> PRT

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Gly Tyr

<210> 51

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<400> 51

Lys Asp Xaa Xaa Gly Tyr Val Ala Asn Gly Ile Asn Gly Xaa Pro Lys
 1 5 10 15

Gly Tyr

<210> 52
 <211> 18
 <212> PRT
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<220>
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<400> 52

Lys Asp Xaa Xaa Gly Tyr Val Ala Asp Gly Ile Asn Gly Xaa Pro Lys
 1 5 10 15

Gly Tyr

<210> 53
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<400> 53

Lys	Asp	Xaa	Xaa	Gly	Tyr	Val	Ala	Asp	Gly	Ile	Asn	Gly	Xaa	Pro	Lys
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Gly Tyr

<210> 54
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 <223> Xaa is epsilon-aminocaproic acid

<400> 54

Lys	Asp	Xaa	Xaa	Gly	Tyr	Val	Ala	Asp	Gly	Ile	Asn	Gly	Xaa	Pro	Lys
1				5					10					15	

Gly Tyr

<210> 55

<211> 14

<212> PRT

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<220>

<223> protease indicator

<220>

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<223> Xaa is alpha-aminoisobutyric acid

<400> 55

Lys	Asp	Xaa	Tyr	Val	His	Asp	Ala	Pro	Val	Pro	Lys	Gly	Tyr
1				5					10				

<210> 56

<211> 14

<212> PRT

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<220>

<221> misc_feature

<222> (3)..(3)

<223> Xaa is alpha-aminoisobutyric acid

<400> 56

Lys	Asp	Xaa	Tyr	Val	His	Asp	Ala	Pro	Val	Pro	Lys	Gly	Tyr
1				5					10				

<210> 57

<211> 14

<212> PRT

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<220>

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<220>

<221> misc_feature

<222> (3)..(3)

<223> Xaa is alpha-aminoisobutyric acid

<400> 57

Lys Asp Xaa Tyr Val His Asp Ala Pro Val Pro Lys Gly Tyr
1 5 10

<210> 58

<211> 16

<212> PRT

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<220>

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<220>

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<400> 58

Lys Asp Xaa Gly Tyr Val His Asp Ala Pro Val Gly Pro Lys Gly Tyr
1 5 10 15

<210> 59

<211> 16

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<400> 59

Lys Asp Xaa Gly Tyr Val His Asp Ala Pro Val Gly Pro Lys Gly Tyr
1 5 10 15

<210> 60

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<400> 60

Lys Asp Xaa Gly Tyr Val His Asp Ala Pro Val Gly Pro Lys Gly Tyr
 1 5 10 15

<210> 61

<211> 17

<212> PRT

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<222> (4)..(4)

<223> Xaa is episilon-aminocaproic acid

<400> 61

Lys Asp Xaa Xaa Gly Tyr Val His Asp Ala Pro Val Gly Pro Lys Gly
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Tyr

<210> 62

<211> 17

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<400> 62

Lys Asp Xaa Xaa Gly Tyr Val His Asp Ala Pro Val Gly Pro Lys Gly
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Tyr

<210> 63
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<400> 63

Lys Asp Xaa Xaa Gly Tyr Val His Asp Ala Pro Val Gly Pro Lys Gly
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Tyr

<210> 64
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Tyr

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Lys Asp Xaa Xaa Gly Tyr Val His Asp Ala Pro Val Gly Pro Lys Gly
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Tyr

<210> 66
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<400> 66

Lys Asp Xaa Xaa Gly Asp Tyr Val His Asp Ala Pro Val Gly Pro Lys
1 5 10 15

Gly Tyr

<210> 67
<211> 17
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<222> (4)..(4)
<223> X is epsilon aminocaproic acid

<400> 67

Lys Asp Pro Xaa Gly Leu Val Glu Ile Asp Asn Gly Xaa Pro Lys Gly
1 5 10 15

Tyr

<210> 68
<211> 17
<212> PRT
<213> Artificial

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<400> 68

Lys Asp Pro Xaa Gly Leu Val Glu Ile Glu Asn Gly Xaa Pro Lys Gly
1 5 10 15

Tyr

<210> 69

<211> 14

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

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<223> X is Aib

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Lys Asp Xaa Leu Val Glu Ile Asp Asn Gly Pro Lys Gly Tyr
1 5 10

<210> 70

<211> 16

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<220>

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<210> 71

<211> 18

<212> PRT

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<400> 71

Lys Asp Xaa Xaa Gly Leu Val Glu Ile Asp Asn Gly Gly Xaa Pro Lys
1 5 10 15

Gly Tyr

<210> 72
<211> 18
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<400> 72

Lys Asp Xaa Xaa Gly Leu Val Glu Ile Asn Asn Gly Gly Xaa Pro Lys
1 5 10 15

Gly Tyr

<210> 73

<211> 18

<212> PRT

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<400> 73

Lys	Asp	Pro	Xaa	Gly	Ile	Glu	Thr	Glu	Ser	Gly	Val	Gly	Xaa	Pro	Lys
1				5				10						15	

Gly Tyr

<210> 74

<211> 16

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

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<223> K is blocked with Fmoc

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<400> 74

Lys	Asp	Pro	Xaa	Gly	Ile	Glu	Thr	Asp	Ser	Gly	Xaa	Pro	Lys	Gly	Tyr
1				5					10					15	

<210> 75
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<400> 75

Lys	Asp	Pro	Xaa	Gly	Ile	Glu	Thr	Glu	Ser	Gly	Xaa	Pro	Lys	Gly	Tyr
1				5					10					15	

<210> 76
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<400> 76

Lys Asp Xaa Gly Ile Glu Thr Asp Ser Gly Val Asp Asp Pro Lys Gly
1 5 10 15

Tyr

<210> 77
<211> 17
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<400> 77

Lys Asp Xaa Gly Ile Glu Thr Asn Ser Gly Val Asp Asp Pro Lys Gly
1 5 10 15

Tyr

<210> 78
<211> 19
<212> PRT
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<400> 78

Lys Asp Xaa Gly Gly Ile Glu Thr Asp Ser Gly Val Asp Asp Gly Pro
1 5 10 15

Lys Gly Tyr

<210> 79
<211> 17
<212> PRT
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<223> X is Aib

<400> 79

Lys Asp Xaa Gly Gly Ile Glu Thr Asn Ser Gly Val Gly Pro Lys Gly
1 5 10 15

Tyr

<210> 80

<211> 17

<212> PRT

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<220>

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<400> 80

Lys Asp Xaa Xaa Gly Ile Glu Thr Asp Ser Gly Val Xaa Pro Lys Gly
1 5 10 15

Tyr

<210> 81

<211> 17

<212> PRT

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<220>
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<400> 81

Lys Asp Xaa Xaa Gly Ile Glu Thr Asn Ser Gly Val Xaa Pro Lys Gly
1 5 10 15

Tyr

<210> 82
<211> 19
<212> PRT
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<400> 82

Lys Asp Xaa Xaa Gly Gly Ile Glu Thr Asp Ser Gly Val Gly Xaa Pro
1 5 10 15

Lys Gly Tyr

<210> 83
<211> 19
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<400> 83

Lys	Asp	Xaa	Xaa	Gly	Gly	Ile	Glu	Thr	Asn	Ser	Gly	Val	Gly	Xaa	Pro
1				5					10					15	

Lys Gly Tyr

<210> 84
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<400> 84

Lys	Asp	Xaa	Gly	Ser	Glu	Ser	Met	Asp	Ser	Gly	Ile	Ser	Leu	Asp	Pro
1				5					10					15	

Lys Gly Tyr

<210> 85

<211> 17

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<223> X is Aib

<400> 85

Lys Asp Xaa Gly Gly Ser Glu Ser Met Asp Ser Gly Gly Pro Lys Gly
1 5 10 15

Tyr

<210> 86

<211> 19

<212> PRT

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<220>

<221> MOD_RES

<222> (4)..(4)

<223> X is epsilon aminocaproic acid

<400> 86

Lys Asp Xaa Xaa Gly Gly Ser Glu Ser Met Asp Ser Gly Gly Xaa Pro
1 5 10 15

Lys Gly Tyr

<210> 87
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<400> 87

Lys Asp Xaa Xaa Gly Asp Val Val Cys Cys Ser Met Ser Gly Xaa Pro
1 5 10 15

Lys Gly Tyr

<210> 88
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<400> 88

Lys Asp Xaa Xaa Gly Asp Val Val Cys Asp Ser Met Ser Gly Xaa Pro
1 5 10 15

Lys Gly Tyr

<210> 89
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<400> 89

Lys Asp Xaa Xaa Gly Asp Val Val Cys Cys Ser Met Ser Gly Xaa Pro
1 5 10 15

Lys Gly Tyr

<210> 90
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<400> 90

Lys	Asp	Xaa	Xaa	Gly	Asp	Val	Val	Cys	Asp	Ser	Met	Ser	Gly	Xaa	Pro
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Lys Gly Tyr

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<400> 91

Lys Asp Xaa Xaa Gly Asp Val Val Cys Cys Pro Met Ser Gly Xaa Pro
1 5 10 15

Lys Gly Tyr

<210> 92
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<400> 92

Lys Asp Xaa Xaa Gly Glu Asp Val Val Cys Cys Ser Gly Xaa Pro Lys
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Gly Tyr

<210> 93
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<400> 93

Lys	Asp	Xaa	Xaa	Gly	Glu	Asp	Val	Val	Cys	Asp	Ser	Gly	Xaa	Pro	Lys
1				5					10					15	

Gly Tyr

<210> 94
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<400> 94

Lys Asp Xaa Xaa Gly Glu Asp Val Val Cys Cys Pro Gly Xaa Pro Lys
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Gly Tyr

<210> 95
<211> 18
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<400> 95

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Gly Tyr

<210> 96
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<400> 96

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1 5 10 15

Lys Gly Tyr

<210> 97
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<400> 97

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Lys Gly Tyr

<210> 98
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<220>
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<400> 98

Lys Asp Xaa Xaa Gly Asp Val Val Cys Cys Pro Met Ser Gly Xaa Pro
1 5 10 15

Lys Gly Tyr

<210> 99
<211> 18
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<220>
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<400> 99

Lys Asp Xaa Xaa Gly Asp Val Val Cys Cys Ser Met Gly Xaa Pro Lys
1 5 10 15

Gly Tyr

<210> 100
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<220>

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<400> 100

Lys Asp Xaa Xaa Gly Asp Val Val Cys Asp Ser Met Gly Xaa Pro Lys
1 5 10 15

Gly Tyr

<210> 101

<211> 16

<212> PRT

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<223> X is epsilon aminocaproic acid

<400> 101

Lys	Asp	Xaa	Xaa	Gly	Val	Cys	Cys	Ser	Met	Gly	Xaa	Pro	Lys	Gly	Tyr
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<210> 102

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<223> X is epsilon aminocaproic acid

<400> 102

Lys	Asp	Xaa	Xaa	Gly	Val	Cys	Asp	Ser	Met	Gly	Xaa	Pro	Lys	Gly	Tyr
1				5					10					15	

<210> 103

<211> 19

<212> PRT

<213> Artificial

<220>

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<223> X is Aib

<220>

<221> MOD_RES

<222> (4)..(4)

<223> X is epsilon aminocaproic acid

<400> 103

Lys Asp Xaa Xaa Gly Asp Glu Met Glu Glu Cys Ser Gln His Leu Pro
 1 5 10 15

Lys Gly Tyr

<210> 104
 <211> 19
 <212> PRT
 <213> Artificial

<220>
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<220>
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 <222> (4)..(4)
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<400> 104

Lys Asp Xaa Xaa Gly Asp Glu Met Glu Glu Cys Pro Gln His Leu Pro
 1 5 10 15

Lys Gly Tyr

<210> 105
 <211> 19
 <212> PRT
 <213> Artificial

<220>
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<400> 105

Lys Asp Xaa Xaa Gly Asp Glu Met Glu Glu Asp Ser Gln His Leu Pro
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Lys Gly Tyr

<210> 106
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 <213> artificial sequence .

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<400> 106

Lys Asp Xaa Xaa Gly Glu Met Glu Glu Cys Ser Gln His Leu Pro Lys
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Gly Tyr

<210> 107
 <211> 18
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<400> 107

Lys Asp Xaa Xaa Gly Glu Met Glu Glu Cys Pro Gln His Leu Pro Lys
 1 5 10 15

Gly Tyr

<210> 108
<211> 18
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<400> 108

Lys Asp Xaa Xaa Gly Glu Met Glu Glu Asp Ser Gln His Leu Pro Lys
1 5 10 15

Gly Tyr

<210> 109
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<400> 109

Lys Asp Xaa Xaa Gly Glu Met Glu Glu Cys Ser Gln His Leu Gly Pro
1 5 10 15

Lys Gly Tyr

<210> 110
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<400> 110

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1 5 10 15

Lys Gly Tyr

<210> 111
<211> 19
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<400> 111

Lys Asp Xaa Xaa Gly Glu Met Glu Glu Asp Ser Gln His Leu Gly Pro
1 5 10 15

Lys Gly Tyr

<210> 112
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<220>
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<220>
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<223> X is epsilon aminocaproic acid

<400> 112

Lys Asp Xaa Xaa Gly Glu Met Glu Glu Cys Ser Gln His Leu Gly Xaa
1 5 10 15

Pro Lys Gly Tyr
20

<210> 113
<211> 20
<212> PRT
<213> Artificial

<220>
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<220>
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<223> X is epsilon aminocaproic acid

<400> 113

Lys Asp Xaa Xaa Gly Glu Met Glu Glu Cys Pro Gln His Leu Gly Xaa
1 5 10 15

Pro Lys Gly Tyr
20

<210> 114

<211> 20

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

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<220>

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<222> (4)..(4)

<223> X is epsilon aminocaproic acid

<400> 114

Lys Asp Xaa Xaa Gly Glu Met Glu Glu Asp Ser Gln His Leu Gly Xaa
1 5 10 15

Pro Lys Gly Tyr
20

<210> 115

<211> 17

<212> PRT

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<220>
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<223> X is epsilon aminocaproic acid

<400> 115

Lys Asp Xaa Xaa Gly Val Met Thr Gly Arg Thr Gly Xaa Pro Lys Gly
1 5 10 15

Tyr

<210> 116
<211> 17
<212> PRT
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<220>
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<220>
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<220>
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<223> M is D form

<220>
<221> MOD_RES
<222> (4)..(4)
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<400> 116

Lys Asp Xaa Xaa Gly Val Met Thr Gly Arg Thr Gly Xaa Pro Lys Gly

1 5 10 15

Tyr

<210> 117

<211> 17

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

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<223> X is Aib

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<222> (13)..(13)

<223> X is episilon-aminocaproic acid

<220>

<221> MOD_RES

<222> (4)..(4)

<223> X is epsilon aminocaproic acid

<400> 117

Lys Asp Xaa Xaa Gly Val Met Thr Gly Arg Thr Gly Xaa Pro Lys Gly
1 5 10 15

Tyr

<210> 118

<211> 17

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

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<223> X is episilon-aminocaproic acid

<220>
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<400> 118

Lys	Asp	Xaa	Xaa	Gly	Val	Met	Thr	Gly	Arg	Thr	Gly	Xaa	Pro	Lys	Gly
1				5					10					15	

Tyr

<210> 119
 <211> 16
 <212> PRT
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<220>
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<220>
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 <222> (4)..(4)
 <223> X is epsilon aminocaproic acid

<400> 119

Lys	Asp	Xaa	Xaa	Gly	Val	Met	Thr	Gly	Arg	Gly	Xaa	Pro	Lys	Gly	Tyr
1				5					10					15	

<210> 120
 <211> 17
 <212> PRT
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<220>
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<223> X is episilon-aminocaproic acid

<220>
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<223> X is epsilon aminocaproic acid

<400> 120

Lys	Asp	Xaa	Xaa	Gly	Val	Met	Thr	Gly	Arg	Gly	Gly	Xaa	Pro	Lys	Gly
1				5					10					15	

Tyr

<210> 121
<211> 17
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<220>
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<222> (13)..(13)
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<220>
<221> MOD_RES
<222> (7)..(7)
<223> M is D form

<220>
<221> MOD_RES
<222> (4)..(4)
<223> X is epsilon aminocaproic acid

<400> 121

Lys Asp Xaa Xaa Gly Val Met Thr Gly Arg Gly Gly Xaa Pro Lys Gly
 1 5 10 15

Tyr

<210> 122
 <211> 8
 <212> PRT
 <213> Artificial

<220>
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<220>
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<220>
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 <222> (1)..(1)
 <223> K is blocked with Fmoc

<400> 122

Lys Asp Pro Xaa Thr Gly Arg Thr
 1 5

<210> 123
 <211> 11
 <212> PRT
 <213> Artificial

<220>
 <223> Synthetic peptide substrate

<220>
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 <223> D is blocked with Fmoc

<400> 123

Asp Pro Thr Gly Arg Thr Gly Pro Lys Gly Tyr
 1 5 10

<210> 124
 <211> 15
 <212> PRT
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<220>

<223> Synthetic peptide substrate
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 <223> K is blocked with Fmoc

 <220>
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 <223> X is episilon-aminocaproic acid

 <400> 124

 Lys Asp Pro Val Met Thr Gly Arg Thr Gly Xaa Pro Lys Gly Tyr
 1 5 10 15

 <210> 125
 <211> 13
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 <220>
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 <400> 125

 Lys Asp Pro Thr Gly Arg Thr Gly Xaa Pro Lys Gly Tyr
 1 5 10

 <210> 126
 <211> 15
 <212> PRT
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 <220>
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<220>
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<220>
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 <222> (11)..(11)
 <223> X is episilon-aminocaproic acid

<400> 126

Lys	Asp	Pro	Xaa	Gly	Thr	Gly	Arg	Thr	Gly	Xaa	Pro	Lys	Gly	Tyr
1				5					10					15

<210> 127
 <211> 14
 <212> PRT
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<220>
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 <223> K is blocked with Fmoc

<220>
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 <222> (4)..(4)
 <223> X is epsilon aminocaproic acid

<400> 127

Lys	Asp	Pro	Xaa	Gly	Thr	Gly	Arg	Thr	Gly	Pro	Lys	Gly	Tyr
1				5					10				

<210> 128
 <211> 13
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<220>
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<220>
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 <223> K is blocked with Fmoc

<400> 128

Lys Asp Pro Gly Thr Gly Arg Thr Gly Pro Lys Gly Tyr
1 5 10

<210> 129

<211> 14

<212> PRT

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<220>

<223> Synthetic peptide substrate

<220>

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<220>

<221> MOD_RES

<222> (10)..(10)

<223> X is episilon-aminocaproic acid

<400> 129

Lys Asp Pro Xaa Thr Gly Arg Thr Gly Xaa Pro Lys Gly Tyr
1 5 10

<210> 130

<211> 13

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

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<223> X is 4-aminobutyric acid

<400> 130

Lys Asp Pro Xaa Thr Gly Arg Thr Gly Pro Lys Gly Tyr
1 5 10

<210> 131

<211> 13

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<213> Artificial

<220>

<223> Synthetic peptide substrate

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<400> 131

Lys Asp Pro Xaa Thr Gly Arg Thr Gly Pro Lys Gly Tyr
1 5 10

<210> 132
<211> 17
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<223> X is epsilon-aminocaproic acid

<220>
<221> MOD_RES
<222> (4)..(4)
<223> X is epsilon aminocaproic acid

<400> 132

Lys Asp Xaa Xaa Gly Val Met Thr Gly Arg Val Gly Xaa Pro Lys Gly
1 5 10 15

Tyr

<210> 133
<211> 17
<212> PRT
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<220>
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<400> 133

Lys Asp Xaa Xaa Gly Val Met Thr Gly Arg Val Gly Xaa Pro Lys Gly
1 5 10 15

Tyr

<210> 134
<211> 17
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<220>
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<400> 134

Lys Asp Xaa Xaa Gly Val Met Thr Gly Arg Ala Gly Xaa Pro Lys Gly

1 5 10 15

Tyr

<210> 135
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<220>
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<220>
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 <222> (4)..(4)
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<400> 135

Lys Asp Xaa Xaa Gly Val Met Thr Gly Arg Ala Gly Xaa Pro Lys Gly
 1 5 10 15

Tyr

<210> 136
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<220>
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<220>
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<400> 136

Lys Asp Pro Xaa Gly Ser Glu Val Lys Leu Asp Ala Glu Phe Gly Xaa
1 5 10 15

Pro Lys Gly Tyr Gly Xaa Pro Lys Gly Tyr
20 25

<210> 137
<211> 20
<212> PRT
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<220>
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<220>
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<223> F is D form

<220>

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<222> (4)..(4)

<223> X is epsilon aminocaproic acid

<400> 137

Lys Asp Pro Xaa Gly Ser Glu Val Lys Leu Asp Ala Glu Phe Gly Xaa
1 5 10 15

Pro Lys Gly Tyr
20

<210> 138

<211> 20

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

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<220>

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<220>

<221> MOD_RES

<222> (14)..(14)

<223> F is D form

<220>

<221> MOD_RES

<222> (4)..(4)
<223> X is epsilon aminocaproic acid

<400> 138

Lys Asp Pro Xaa Gly Ser Glu Val Lys Leu Asp Ala Glu Phe Gly Xaa
1 5 10 15

Pro Lys Gly Tyr
20

<210> 139
<211> 21
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<220>
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<223> X is epsilon aminocaproic acid

<400> 139

Lys Asp Xaa Xaa Gly Ser Glu Val Asn Leu Asp Ala Glu Phe Gly Xaa
1 5 10 15

Pro Lys Asp Asp Tyr
20

<210> 140
<211> 21
<212> PRT
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<220>
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<220>
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<400> 140

Lys Asp Xaa Xaa Gly Ser Glu Val Lys Leu Asp Ala Glu Phe Gly Xaa
1 5 10 15

Pro Lys Asp Asp Tyr
20

<210> 141
<211> 21
<212> PRT
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<220>
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<220>
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<400> 141

Lys Asp Xaa Xaa Gly Ser Glu Val Lys Met Asp Ala Glu Phe Gly Xaa
 1 5 10 15

Pro Lys Asp Asp Tyr
 20

<210> 142
 <211> 21
 <212> PRT
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<220>
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<220>
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<220>
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 <222> (4)..(4)
 <223> X is epsilon aminocaproic acid

<400> 142

Lys Asp Xaa Xaa Gly Ser Glu Val Lys Met Asp Asp Glu Phe Gly Xaa
 1 5 10 15

Pro Lys Asp Asp Tyr
 20

<210> 143
 <211> 21
 <212> PRT
 <213> Artificial

<220>
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 <223> X is Aib

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<223> X is episilon-aminocaproic acid

<220>

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<223> X is epsilon aminocaproic acid

<400> 143

Lys Asp Xaa Xaa Gly Ser Glu Val Asn Leu Asp Asp Glu Phe Gly Xaa
1 5 10 15

Pro Lys Asp Asp Tyr
20

<210> 144

<211> 23

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

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<223> X is episilon-aminocaproic acid

<220>

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<222> (4)..(4)

<223> X is epsilon aminocaproic acid

<400> 144

Lys Asp Xaa Xaa Gly Gly Val Val Ile Ala Thr Val Ile Val Ile Thr
1 5 10 15

Gly Xaa Pro Lys Asp Asp Tyr
20

<210> 145

<211> 24

<212> PRT

<213> Artificial

<220>

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<223> X is epsilon-aminocaproic acid

<220>

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<223> X is epsilon aminocaproic acid

<400> 145

Lys Asp Xaa Xaa Gly Tyr Gly Val Val Ile Ala Thr Val Ile Val Ile
1 5 10 15

Thr Gly Xaa Pro Lys Asp Asp Tyr
20

<210> 146

<211> 18

<212> PRT

<213> Artificial

<220>

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<223> X is Aib

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<223> X is epsilon-aminocaproic acid

<220>

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<222> (4)..(4)

<223> X is epsilon aminocaproic acid

<400> 146

Lys Asp Xaa Xaa Gly Val Ile Ala Thr Val Ile Gly Xaa Pro Lys Asp

1 5 10 15

Asp Tyr

<210> 147
 <211> 18
 <212> PRT
 <213> Artificial

<220>
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<220>
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<220>
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 <222> (13)..(13)
 <223> X is episilon-aminocaproic acid

<220>
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 <222> (4)..(4)
 <223> X is epsilon aminocaproic acid

<400> 147

Lys Asp Xaa Xaa Asx Tyr Gly Val Val Ile Ala Gly Xaa Pro Lys Asp
 1 5 10 15

Asp Tyr

<210> 148
 <211> 15
 <212> PRT
 <213> Artificial

<220>
 <223> Synthetic peptide substrate

<220>
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 <222> (12)..(13)
 <223> X is episilon-aminocaproic acid

<220>
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<222> (4)..(5)
<223> X is epsilon aminocaproic acid

<400> 148

Lys	Asp	Xaa	Xaa	Xaa	Gln	Gln	Leu	Leu	His	Asn	Xaa	Xaa	Pro	Lys
1				5					10					15

<210> 149
<211> 15
<212> PRT
<213> Artificial

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<222> (13)..(13)
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<220>
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<223> X is epsilon aminocaproic acid

<400> 149

Lys	Asp	Xaa	Xaa	Gly	Gln	Gln	Leu	Leu	His	Asn	Gly	Xaa	Pro	Lys
1				5					10					15

<210> 150
<211> 13
<212> PRT
<213> Artificial

<220>
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<223> X is Aib

<400> 150

Lys Asp Xaa Gly Gln Gln Leu Leu His Asn Gly Pro Lys
1 5 10

<210> 151

<211> 11

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

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<221> MOD_RES

<222> (3)..(3)

<223> X is Aib

<400> 151

Lys Asp Xaa Gln Gln Leu Leu His Asn Pro Lys
1 5 10

<210> 152

<211> 15

<212> PRT

<213> Artificial

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<223> Synthetic peptide substrate

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<222> (12)..(13)

<223> X is episilon-aminocaproic acid

<220>

<221> MOD_RES

<222> (4)..(5)

<223> X is epsilon aminocaproic acid

<400> 152

Lys Asp Xaa Xaa Xaa Ser Ile Gln Tyr Thr Tyr Xaa Xaa Pro Lys
1 5 10 15

<210> 153


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<211> 15
<212> PRT
<213> Artificial

<220>
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<222> (13)..(13)
<223> X is epsilon-aminocaproic acid

<220>
<221> MOD_RES
<222> (4)..(4)
<223> X is epsilon aminocaproic acid

<400> 153

Lys Asp Xaa Xaa Gly Ser Ile Gln Tyr Thr Tyr Gly Xaa Pro Lys
1          5          10          15

<210> 154
<211> 13
<212> PRT
<213> Artificial

<220>
<223> Synthetic peptide substrate

<220>
<221> MOD_RES
<222> (3)..(3)
<223> X is Aib

<400> 154

Lys Asp Xaa Gly Ser Ile Gln Tyr Thr Tyr Gly Pro Lys
1          5          10

<210> 155
<211> 11
<212> PRT
<213> Artificial

<220>
<223> Synthetic peptide substrate

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<220>
<221> MOD_RES
<222> (3)..(3)
<223> X is Aib

<400> 155

Lys	Asp	Xaa	Ser	Ile	Gln	Tyr	Thr	Tyr	Pro	Lys
1				5					10	

<210> 156
<211> 15
<212> PRT
<213> Artificial

<220>
<223> Synthetic peptide substrate

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<223> X is epsilon-aminocaproic acid

<220>
<221> MOD_RES
<222> (4)..(5)
<223> X is epsilon aminocaproic acid

<400> 156

Lys	Asp	Xaa	Xaa	Xaa	Ser	Ser	Gln	Tyr	Ser	Asn	Xaa	Xaa	Pro	Lys
1				5					10				15	

<210> 157
<211> 15
<212> PRT
<213> Artificial

<220>
<223> Synthetic peptide substrate

<220>
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<220>

<221> MOD_RES
<222> (13)..(13)
<223> X is epsilon-aminocaproic acid

<220>
<221> MOD_RES
<222> (4)..(4)
<223> X is epsilon aminocaproic acid

<400> 157

Lys	Asp	Xaa	Xaa	Gly	Ser	Ser	Gln	Tyr	Ser	Asn	Gly	Xaa	Pro	Lys
1				5					10					15

<210> 158
<211> 13
<212> PRT
<213> Artificial

<220>
<223> Synthetic peptide substrate

<220>
<221> MOD_RES
<222> (3)..(3)
<223> X is Aib

<400> 158

Lys	Asp	Xaa	Gly	Ser	Ser	Gln	Tyr	Ser	Asn	Gly	Pro	Lys
1				5					10			

<210> 159
<211> 11
<212> PRT
<213> Artificial

<220>
<223> Synthetic peptide substrate

<220>
<221> MOD_RES
<222> (3)..(3)
<223> X is Aib

<400> 159

Lys	Asp	Xaa	Ser	Ser	Gln	Tyr	Ser	Asn	Pro	Lys
1				5					10	

<210> 160
<211> 15
<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> MOD_RES

<222> (3)..(3)

<223> X is Aib

<220>

<221> MOD_RES

<222> (12)..(13)

<223> X is epsilon-aminocaproic acid

<220>

<221> MOD_RES

<222> (4)..(5)

<223> X is epsilon aminocaproic acid

<400> 160

Lys	Asp	Xaa	Xaa	Xaa	Ser	Ser	Ile	Tyr	Ser	Gln	Xaa	Xaa	Pro	Lys
1				5					10					15

<210> 161

<211> 15

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> MOD_RES

<222> (3)..(3)

<223> X is Aib

<220>

<221> MOD_RES

<222> (13)..(13)

<223> X is epsilon-aminocaproic acid

<220>

<221> MOD_RES

<222> (4)..(4)

<223> X is epsilon aminocaproic acid

<400> 161

Lys	Asp	Xaa	Xaa	Gly	Ser	Ser	Ile	Tyr	Ser	Gln	Gly	Xaa	Pro	Lys
-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----

1	5	10	15
---	---	----	----

<210> 162
 <211> 13
 <212> PRT
 <213> Artificial

 <220>
 <223> Synthetic peptide substrate

 <220>
 <221> MOD_RES
 <222> (3)..(3)
 <223> X is Aib

 <400> 162

 Lys Asp Xaa Gly Ser Ser Ile Tyr Ser Gln Gly Pro Lys
 1 5 10

 <210> 163
 <211> 11
 <212> PRT
 <213> Artificial

 <220>
 <223> Synthetic peptide substrate

 <220>
 <221> MOD_RES
 <222> (3)..(3)
 <223> X is Aib

 <400> 163

 Lys Asp Xaa Ser Ser Ile Tyr Ser Gln Pro Lys
 1 5 10

 <210> 164
 <211> 20
 <212> PRT
 <213> Artificial

 <220>
 <223> Synthetic peptide substrate

 <220>
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 <222> (4)..(4)
 <223> X is epsilon aminocaproic acid

 <220>
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<223> X is episilon-aminocaproic acid

<220>

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<222> (1)..(1)

<223> K is blocked with Fmoc

<400> 164

Lys Asp Pro Xaa Gly Ser Glu Val Asn Leu Asp Ala Glu Phe Gly Xaa
1 5 10 15

Pro Lys Gly Tyr
20

<210> 165

<211> 18

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> MOD_RES

<222> (1)..(1)

<223> K is blocked with Fmoc

<220>

<221> MOD_RES

<222> (14)..(14)

<223> X is episilon-aminocaproic acid

<220>

<221> MOD_RES

<222> (4)..(4)

<223> X is epsilon aminocaproic acid

<400> 165

Lys Asp Pro Xaa Gly Leu Glu His Asp Gly Ile Asn Gly Xaa Pro Lys
1 5 10 15

Gly Tyr

<210> 166

<211> 18

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> MOD_RES

<222> (1)..(1)

<223> K is blocked with Fmoc

<220>

<221> MOD_RES

<222> (14)..(14)

<223> X is episilon-aminocaproic acid

<220>

<221> MOD_RES

<222> (4)..(4)

<223> X is epsilon aminocaproic acid

<400> 166

Lys	Asp	Pro	Xaa	Gly	Leu	Glu	Thr	Asp	Gly	Ile	Asn	Gly	Xaa	Pro	Lys
1				5					10					15	

Gly Tyr

<210> 167

<211> 18

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> MOD_RES

<222> (1)..(1)

<223> K is blocked with Fmco

<220>

<221> MOD_RES

<222> (14)..(14)

<223> X is episilon-aminocaproic acid

<220>

<221> MOD_RES

<222> (4)..(4)

<223> X is epsilon aminocaproic acid

<400> 167

Lys	Asp	Pro	Xaa	Gly	Trp	Glu	His	Asp	Gly	Ile	Asn	Gly	Xaa	Pro	Lys
-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----

1 5 10 15

Gly Tyr

<210> 168

<211> 15

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> MOD_RES

<222> (1)..(1)

<223> K is blocked with Fmoc

<220>

<221> MOD_RES

<222> (11)..(11)

<223> X is epsilon-aminocaproic acid

<220>

<221> MOD_RES

<222> (4)..(4)

<223> X is epsilon aminocaproic acid

<400> 168

Lys Asp Pro Xaa Gly Tyr Val His Asp Gly Xaa Pro Lys Gly Tyr
1 5 10 15

<210> 169

<211> 18

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> MOD_RES

<222> (1)..(1)

<223> K is blocked with Fmoc

<220>

<221> MOD_RES

<222> (14)..(14)

<223> X is epsilon-aminocaproic acid

<220>

<221> MOD_RES
<222> (4)..(4)
<223> X is epsilon aminocaproic acid

<400> 169

Lys Asp Pro Xaa Gly Tyr Val His Asp Gly Ile Asn Gly Xaa Pro Lys
1 5 10 15

Gly Tyr

<210> 170
<211> 18
<212> PRT
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<220>
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<222> (4)..(4)
<223> Xaa is epsilon aminocaproic acid (Ahx)

<220>
<221> misc_feature
<222> (14)..(14)
<223> Xaa is epsilon aminocaproic acid (Ahx)

<400> 170

Lys Asp Pro Xaa Gly Tyr Val His Asp Ala Pro Val Gly Xaa Pro Lys
1 5 10 15

Gly Tyr

<210> 171
<211> 18
<212> PRT
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<220>
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<220>
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<220>
<221> misc_feature

<222> (14)..(14)
<223> Xaa is epsilon aminocaproic acid (Ahx)

<400> 171

Lys	Asp	Pro	Xaa	Gly	Tyr	Val	His	Asp	Ala	Pro	Val	Gly	Xaa	Pro	Lys
1				5					10				15		

Gly Tyr

<210> 172
<211> 16
<212> PRT
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<220>
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<220>
<221> misc_feature
<222> (12)..(12)
<223> Xaa is epsilon aminocaproic acid (Ahx)

<400> 172

Lys	Asp	Pro	Xaa	Val	His	Asp	Ala	Pro	Val	Gly	Xaa	Pro	Lys	Gly	Tyr
1				5					10				15		

<210> 173
<211> 16
<212> PRT
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<220>
<223> Protease indicator

<220>
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<222> (4)..(4)
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<220>
<221> misc_feature
<222> (12)..(12)
<223> Xaa is epsilon aminocaproic acid (Ahx)

<400> 173

Lys Asp Pro Xaa Gly Tyr Val His Asp Ala Gly Xaa Pro Lys Gly Tyr
1 5 10 15

<210> 174

<211> 16

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> MOD_RES

<222> (1)..(1)

<223> K is blocked with Fmoc

<220>

<221> MOD_RES

<222> (12)..(12)

<223> X is epsilon-aminocaproic acid

<220>

<221> MOD_RES

<222> (4)..(4)

<223> X is epsilon aminocaproic acid

<400> 174

Lys Asp Pro Xaa Gly Ile Glu Pro Asp Ser Gly Xaa Pro Lys Gly Tyr
1 5 10 15

<210> 175

<211> 18

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

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<220>

<221> MOD_RES

<222> (14)..(14)

<223> X is epsilon-aminocaproic acid

<220>

<221> MOD_RES
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<223> X is epsilon aminocaproic acid

<400> 175

Lys Asp Pro Xaa Gly Pro Leu Gly Ile Ala Gly Ile Gly Xaa Pro Lys
1 5 10 15

Gly Tyr

<210> 176
<211> 19
<212> PRT
<213> Artificial

<220>
<223> Synthetic peptide substrate

<220>
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<220>
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<222> (15)..(15)
<223> X is episilon-aminocaproic acid

<220>
<221> MOD_RES
<222> (4)..(4)
<223> X is epsilon aminocaproic acid

<400> 176

Lys Asp Pro Xaa Gly Ser Gln Asn Tyr Pro Ile Val Gln Gly Xaa Pro
1 5 10 15

Lys Gly Tyr

<210> 177
<211> 18
<212> PRT
<213> Artificial

<220>
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<220>
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<222> (1)..(1)
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<220>
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<223> X is epsilon-aminocaproic acid

<220>
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<223> X is epsilon aminocaproic acid

<400> 177

Lys Asp Pro Xaa Gly Glu Asp Val Val Cys Cys Ser Gly Xaa Pro Lys
1 5 10 15

Gly Tyr

<210> 178
<211> 10
<212> PRT
<213> Artificial

<220>
<223> Peptide spacer

<400> 178

Asp Gly Ser Gly Gly Gly Glu Asp Glu Lys
1 5 10

<210> 179
<211> 7
<212> PRT
<213> Artificial

<220>
<223> peptide spacer

<400> 179

Lys Glu Asp Gly Gly Asp Lys
1 5

<210> 180
<211> 8
<212> PRT
<213> Artificial

<220>
<223> Peptide spacer

<220>
<221> Artificial
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<223> Spacer

<400> 180

Asp Gly Ser Gly Glu Asp Glu Lys
1 5

<210> 181
<211> 9
<212> PRT
<213> Artificial

<220>
<223> Peptide spacer

<220>
<221> Artificial
<222> (1)..(9)
<223> Spacer

<400> 181

Lys Glu Asp Glu Gly Ser Gly Asp Lys
1 5

<210> 182
<211> 8
<212> PRT
<213> Artificial

<220>
<223> protease inhibitor

<400> 182

Asp Val Val Cys Cys Ser Met Ser
1 5

<210> 183
<211> 7
<212> PRT
<213> artificial

<220>
<223> protease inhibitor

<220>
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<222> (6)..(6)
<223> d amino acid

<400> 183

Asp Val Val Cys Pro Met Ser
1 5

<210> 184

<211> 9

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> MOD_RES

<222> (5)..(5)

<223> X is norleucine

<400> 184

Asp Ala Ile Pro Xaa Ser Ile Pro Cys
1 5

<210> 185

<211> 11

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> MOD_RES

<222> (5)..(5)

<223> X is norleucine

<400> 185

Asp Ala Ile Pro Xaa Ser Ile Pro Lys Gly Tyr
1 5 10

<210> 186

<211> 11

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

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<223> Artificial = synthetic protease indicator

<220>
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<222> (9)..(9)
<223> K is derivatized with fluorophore

<220>
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<222> (1)..(1)
<223> D is derivatized with fluorophore

<400> 186

Asp Glu Val Asp Gly Ile Asp Pro Lys Gly Tyr
1 5 10

<210> 187
<211> 12
<212> PRT
<213> Artificial

<220>
<223> Synthetic peptide substrate

<220>
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<220>
<221> MOD_RES
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<223> P is derivatized with fluorophore

<220>
<221> MOD_RES
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<223> K is derivatized with fluorophore

<400> 187

Pro Asp Glu Val Asp Gly Ile Asp Pro Lys Gly Tyr
1 5 10

<210> 188
<211> 12
<212> PRT
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<223> Synthetic peptide substrate

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<221> misc_feature

<223> Artificial sequence = synthetic protease indicator

<220>

<221> MOD_RES

<222> (6)..(6)

<223> X is norleucine (Nlu)

<220>

<221> MOD_RES

<222> (10)..(10)

<223> K is derivatized with fluorophore

<220>

<221> MOD_RES

<222> (1)..(1)

<223> K is blocked with Fmoc

<220>

<221> MOD_RES

<222> (1)..(1)

<223> K is derivatized with fluorophore

<400> 188

Lys Asp Ala Ile Pro Xaa Ser Ile Pro Lys Gly Tyr
1 5 10

<210> 189

<211> 12

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

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<221> misc_feature

<223> Artificial sequence = synthetic protease indicator

<220>

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<220>

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<222> (10)..(10)

<223> K is derivatized with fluorophore

<220>
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<222> (6)..(6)
<223> X is norleucine (Nlu)

<400> 189

Lys Asp Ala Ile Pro Xaa Ser Ile Pro Lys Gly Tyr
1 5 10

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<212> PRT
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<220>
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<400> 190

Asp Ala Ile Pro Xaa Ser Ile Pro Lys Gly Tyr
1 5 10

<210> 191
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<220>
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<220>
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<223> ARTIFICIAL = synthetic protease indicator

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<220>

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<222> (12)..(12)

<223> K is derivatized with fluorophore

<400> 191

Lys Asp Asx Asp Glu Val Asp Gly Ile Asp Pro Lys Gly Tyr
1 5 10

<210> 192

<211> 14

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> misc_feature

<223> Artificial = synthetic protease indicator

<220>

<221> misc_feature

<222> (1)..(1)

<223> K is derivatized with fluorophore

<220>

<221> misc_feature

<222> (12)..(12)

<223> K is derivatized with fluorophore

<400> 192

Lys Asp Asx Asp Glu Val Asp Gly Ile Asp Pro Lys Gly Tyr
1 5 10

<210> 193

<211> 14
 <212> PRT
 <213> Artificial

 <220>
 <223> Synthetic peptide substrate

 <220>
 <221> misc_feature
 <223> ARTIFICIAL/UNKNOWN = synthetic protease indicator

<220>
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 <222> (1)..(1)
 <223> K is derivatized with fluroophore

<220>
 <221> MOD_RES
 <222> (1)..(1)
 <223> K is blocked with Fmoc

<220>
 <221> MOD_RES
 <222> (12)..(12)
 <223> K is derivatized with fluroophore

<400> 193

Lys	Asp	Asx	Asp	Glu	Val	Asn	Gly	Ile	Asp	Pro	Lys	Gly	Tyr
1				5					10				

<210> 194
 <211> 14
 <212> PRT
 <213> Artificial

<220>
 <223> Synthetic peptide substrate

<220>
 <221> misc_feature
 <223> ARTIFICIAL/UNKNOWN = synthetic protease indicator

<220>
 <221> misc_feature
 <222> (1)..(1)
 <223> K is derivatized with fluorophore

<220>
 <221> misc_feature
 <222> (12)..(12)

<223> K is derivatized with fluorophore

<400> 194

Lys Asp Asx Asp Glu Val Asn Gly Ile Asp Pro Lys Gly Tyr
1 5 10

<210> 195

<211> 13

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> misc_feature

<223> ARTIFICIAL/UNKNOWN = synthetic protease indicator

<220>

<221> MOD_RES

<222> (1)..(1)

<223> K is blocked with Fmoc

<220>

<221> MOD_RES

<222> (11)..(11)

<223> K is derivatized with fluorophore

<400> 195

Lys Asp Asx Glu Val Asp Gly Ile Asp Pro Lys Gly Tyr
1 5 10

<210> 196

<211> 13

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> misc_feature

<223> ARTIFICIAL/UNKNOWN = synthetic protease indicator

<220>

<221> MOD_RES

<222> (1)..(1)

<223> K is derivatized with fluorophore

<220>
 <221> MOD_RES
 <222> (11)..(11)
 <223> K is derivatized with fluorophore

<400> 196

Lys Asp Tyr Asx Ala Asp Gly Ile Asp Pro Lys Gly Tyr
 1 5 10

<210> 197
 <211> 16
 <212> PRT
 <213> Artificial

<220>
 <223> Synthetic peptide substrate

<220>
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 <223> ARTIFICIAL/UNKNOWN = synthetic protease indicator

<220>
 <221> MOD_RES
 <222> (1)..(1)
 <223> K is blocked with Fmoc

<220>
 <221> MOD_RES
 <222> (1)..(1)
 <223> K is derivatized with fluorophore

<220>
 <221> MOD_RES
 <222> (14)..(14)
 <223> K is derivatized with fluorophore

<400> 197

Lys Asp Asx Gly Asp Glu Val Asp Gly Ile Asp Gly Pro Lys Gly Tyr
 1 5 10 15

<210> 198
 <211> 18
 <212> PRT
 <213> Artificial

<220>
 <223> Synthetic peptide substrate

<220>
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<223> ARTIFICIAL/UNKNOWN = synthetic protease indicator

<220>

<221> MOD_RES

<222> (1)..(1)

<223> K is blocked with Fmoc

<220>

<221> MOD_RES

<222> (1)..(1)

<223> K is derivatized with fluorophore

<220>

<221> MOD_RES

<222> (16)..(16)

<223> K is derivatized with fluorophore

<220>

<221> MOD_RES

<222> (14)..(14)

<223> X is epsilon aminocaproic acid

<220>

<221> MOD_RES

<222> (4)..(4)

<223> X is epsilon aminocaproic acid

<400> 198

Lys	Asp	Asx	Xaa	Gly	Asp	Glu	Val	Asp	Gly	Ile	Asp	Gly	Xaa	Pro	Lys
1				5					10					15	

Gly Tyr

<210> 199

<211> 18

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> MOD_RES

<222> (1)..(1)

<223> K is derivatized with benzyloxycarbonyl group

<220>

<221> MOD_RES

<222> (4)..(4)
<223> X is epsilon aminocaproic acid

<220>
<221> MOD_RES
<222> (14)..(14)
<223> X is epsilon aminocaproic acid

<220>
<221> misc_feature
<223> ARTIFICIAL/UNKNOWN = synthetic protease indicator

<220>
<221> MOD_RES
<222> (1)..(1)
<223> K is derivatized with fluorophore

<220>
<221> MOD_RES
<222> (16)..(16)
<223> K is derivatized with fluorophore

<400> 199

Lys	Asp	Asx	Xaa	Gly	Asp	Glu	Val	Asp	Gly	Ile	Asp	Gly	Xaa	Pro	Lys
1				5					10					15	

Gly Tyr

<210> 200
<211> 13
<212> PRT
<213> Artificial

<220>
<223> Synthetic peptide substrate

<220>
<221> misc_feature
<223> ARTIFICIAL/UNKNOWN = synthetic protease indicator

<220>
<221> MOD_RES
<222> (1)..(1)
<223> K is blocked with Fmoc

<220>
<221> MOD_RES
<222> (1)..(1)

<223> K is derivatized with fluorophore

<220>

<221> MOD_RES

<222> (11)..(11)

<223> K is derivatized with fluorophore

<400> 200

Lys Asp Tyr Asx Ala Asp Gly Ile Asp Pro Lys Gly Tyr
1 5 10

<210> 201

<211> 13

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> misc_feature

<223> ARTIFICIAL/UNKNOWN = synthetic protease indicator

<220>

<221> MOD_RES

<222> (1)..(1)

<223> K is derivatized with fluorophore

<220>

<221> MOD_RES

<222> (11)..(11)

<223> K is derivatized with fluorophore

<400> 201

Lys Asp Asx Glu Val Asp Gly Ile Asp Pro Lys Gly Tyr
1 5 10

<210> 202

<211> 12

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> misc_feature

<223> Artificial/Unknown = synthetic protease indicator

<220>
<221> MOD_RES
<222> (1)..(1)
<223> K is blocked with Fmoc

<220>
<221> MOD_RES
<222> (1)..(1)
<223> K is derivatized with fluorophore

<220>
<221> MOD_RES
<222> (10)..(10)
<223> K is derivatized with fluorophore

<220>
<221> MOD_RES
<222> (6)..(6)
<223> X is norleucine (Nlu)

<400> 202

Lys Asp Ala Ile Pro Xaa Ser Ile Pro Lys Gly Tyr
1 5 10

<210> 203
<211> 18
<212> PRT
<213> Artificial

<220>
<223> Protease indicator

<220>
<221> misc_feature
<222> (4)..(4)
<223> Xaa is episilon-aminocaproic acid

<220>
<221> misc_feature
<222> (14)..(14)
<223> Xaa is episilon-aminocaproic acid

<400> 203

Lys Asp Pro Xaa Gly Asp Glu Val Asp Gly Ile Asp Gly Xaa Pro Lys
1 5 10 15

Gly Tyr

<210> 204
<211> 18
<212> PRT
<213> Artificial

<220>
<223> Protease indicator

<220>
<221> misc_feature
<222> (4)..(4)
<223> Xaa is epsilon-aminocaproic acid

<220>
<221> misc_feature
<222> (14)..(14)
<223> Xaa is epsilon-aminocaproic acid

<400> 204

Lys	Asp	Pro	Xaa	Gly	Ile	Glu	Thr	Asp	Ser	Gly	Val	Gly	Xaa	Pro	Lys
1				5				10					15		

Gly Tyr

<210> 205
<211> 18
<212> PRT
<213> Artificial

<220>
<223> Protease indicator

<220>
<221> misc_feature
<222> (4)..(4)
<223> Xaa is epsilon-aminocaproic acid

<220>
<221> misc_feature
<222> (14)..(14)
<223> Xaa is epsilon-aminocaproic acid

<400> 205

Lys	Asp	Pro	Xaa	Gly	Leu	Val	Glu	Ile	Asp	Asn	Gly	Gly	Xaa	Pro	Lys
1				5				10					15		

Gly Tyr

<210> 206

<211> 18
<212> PRT
<213> Artificial

<220>
<223> Protease indicator

<220>
<221> misc_feature
<222> (4)..(4)
<223> Xaa is epsilon-aminocaproic acid

<220>
<221> misc_feature
<222> (14)..(14)
<223> Xaa is epsilon-aminocaproic acid

<400> 206

Lys Asp Pro Xaa Gly Leu Glu His Asp Gly Ile Asn Gly Xaa Pro Lys
1 5 10 15

Gly Tyr

<210> 207
<211> 18
<212> PRT
<213> Artificial

<220>
<223> Protease indicator

<220>
<221> misc_feature
<222> (4)..(4)
<223> Xaa is epsilon-aminocaproic acid

<220>
<221> misc_feature
<222> (14)..(14)
<223> Xaa is epsilon-aminocaproic acid

<400> 207

Lys Asp Pro Xaa Gly Trp Glu His Asp Gly Ile Asn Gly Xaa Pro Lys
1 5 10 15

Gly Tyr

<210> 208
<211> 7

<212> PRT
<213> Artificial

<220>
<223> Synthetic peptide substrate

<400> 208

Ile Glu Thr Asp Ser Gly Val
1 5

<210> 209
<211> 9
<212> PRT
<213> Artificial

<220>
<223> Synthetic peptide substrate

<220>
<221> MOD_RES
<222> (1)..(1)
<223> X is D form of tetrahydroisoquinoline-3-carboxylic acid

<400> 209

Ser Glu Val Asn Leu Asp Ala Glu Phe
1 5

<210> 210
<211> 7
<212> PRT
<213> Artificial

<220>
<223> Synthetic peptide substrate

<220>
<221> Artificial
<222> (1)..(7)
<223> Artificial protease substrate

<400> 210

Tyr Val His Asp Ala Pro Val
1 5

<210> 211
<211> 4
<212> PRT
<213> Artificial

<220>
<223> domaine of protease indicator

<400> 211

Gly Gly Gly Gly
1

<210> 212

<211> 18

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> MOD_RES

<222> (1)..(1)

<223> K is blocked with Fmoc

<220>

<221> MOD_RES

<222> (14)..(14)

<223> X is epsilon-aminocaproic acid

<220>

<221> MOD_RES

<222> (4)..(4)

<223> X is epsilon-aminocaproic acid

<400> 212

Lys Asp Pro Xaa Gly Tyr Val His Asp Ala Pro Val Gly Xaa Pro Lys
1 5 10 15

Gly Tyr

<210> 213

<211> 15

<212> PRT

<213> Artificial

<220>

<223> Synthetic peptide substrate

<220>

<221> MOD_RES

<222> (1)..(1)

<223> K is blocked with Fmoc

<220>

<221> MOD_RES

<222> (4)..(4)

<223> X is epsilon-aminocaproic acid

<220>
<221> MOD_RES
<222> (14)..(14)
<223> X is episilon-aminocaproic acid

<220>
<221> MOD_RES
<222> (15)..(15)
<223> K is blocked with amide

<400> 213

Lys Asp Pro Xaa Gly Tyr Val His Asp Ala Pro Val Lys Gly Tyr
1 5 10 15

<210> 214
<211> 16
<212> PRT
<213> Artificial

<220>
<223> Synthetic peptide substrate

<220>
<221> MOD_RES
<222> (1)..(1)
<223> K is blocked with Fmoc

<220>
<221> MOD_RES
<222> (6)..(6)
<223> X is D form tetrahydroisoquinoline-3-carboxylic acid

<220>
<221> MOD_RES
<222> (4)..(4)
<223> X is episilon-aminocaproic acid

<220>
<221> MOD_RES
<222> (15)..(15)
<223> X is episilon-aminocaproic acid

<400> 214

Lys Asp Pro Tyr Val His Asp Ala Pro Val Gly Lys Pro Lys Gly Tyr
1 5 10 15

<210> 215

<211> 21
<212> PRT
<213> Artificial

<220>
<223> Protease indicator

<220>
<221> misc_feature
<222> (4)..(4)
<223> Xaa is epsilon-aminocaproic acid

<220>
<221> misc_feature
<222> (16)..(16)
<223> Xaa is epsilon-aminocaproic acid

<400> 215

Lys Asp Asx Xaa Gly Ser Glu Val Asn Leu Asp Ala Glu Phe Gly Xaa
1 5 10 15

Pro Lys Asp Asp Tyr
20

<210> 216
<211> 7
<212> PRT
<213> Artificial

<220>
<223> Protease indicator

<400> 216

Tyr Val His Asp Ala Pro Val
1 5

<210> 217
<211> 7
<212> PRT
<213> Artificial

<220>
<223> Protease indicator

<220>
<221> misc_feature
<222> (1)..(1)
<223> Y is "D" form amino acid

<400> 217

Tyr Val His Asp Ala Pro Val

1 5

<210> 218
<211> 14
<212> PRT
<213> Artificial

<220>
<223> Protease indicator

<400> 218

Lys Asp Asx Tyr Val His Asp Ala Pro Val Pro Lys Gly Tyr
1 5 10

<210> 219
<211> 16
<212> PRT
<213> Artificial

<220>
<223> Protease indicator

<400> 219

Lys Asp Asx Gly Tyr Val His Asp Ala Pro Val Gly Pro Lys Gly Tyr
1 5 10 15

<210> 220
<211> 18
<212> PRT
<213> Artificial

<220>
<223> Protease indicator

<220>
<221> misc_feature
<222> (4)..(4)
<223> Xaa is episilon-aminocaproic acid

<220>
<221> misc_feature
<222> (14)..(14)
<223> Xaa is episilon-aminocaproic acid

<400> 220

Lys Asp Asx Xaa Gly Tyr Val His Asp Ala Pro Val Gly Xaa Pro Lys
1 5 10 15

Gly Tyr

<210> 221